



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/036,779	12/31/2001	Marc Goldburg	15685P113	4780
45222	7590	02/07/2006	EXAMINER	
ARRAYCOMM/BLAKELY 12400 WILSHIRE BLVD SEVENTH FLOOR LOS ANGELES, CA 90025-1030				TSE, YOUNG TOI
ART UNIT		PAPER NUMBER		
		2637		

DATE MAILED: 02/07/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	10/036,779	GOLDBURG, MARC
	Examiner	Art Unit
	YOUNG T. TSE	2637

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 23 November 2005.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-17,20 and 21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-17,20 and 21 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 31 December 2001 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ . |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ . | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| | 6) <input type="checkbox"/> Other: _____ . |

DETAILED ACTION

Response to Arguments

1. Applicant's arguments filed November 23, 2005 have been fully considered but they are not persuasive.

The Applicant argues that both Soong and Nakano do not teach or suggest "based on the determination, assigning a first band-edge channel for communication between the first communication device and the second communication device," as required by claim 1. Therefore, claim 1 is allowable over Soong and Nakano. Claims 2-17 depend on allowable claim 1 adding further limitations, and are therefore also allowable over Soong and Nakano.

The examiner respectfully disagrees. Although Soong and Nakano do not use the term "assigning a band-edge channel (emphasis added) for communication between a first communication device and a second communication device", it is inherent and well known in a communications art that a frequency spectrum of a typical (CDMA) signal includes in-band signal power contained within a bandwidth defined by corner frequencies around a center frequency, an out-of-band signal power, and frequency bands (band-edge channels), as shown in Figures 1, 10, 15-16 and 18 by Soong and Figures 1, 3, 5, 9-10 and 16 by Nakano. According to the present invention discussed on page 10 lines 14-17 of the specification, a "band-edge channel" refers to a portion of a band that is in relative close proximity to the band edge. For example, in systems employing guard bands, a band-edge channel refers to at least one or more channels

adjacent to, or second-adjacent to, or within the (in-band) guard band. Further, there is not specific assigned channel recited in claim 1 for the first band-edge channel. Therefore, the communication between a first communication device and a second communication device in Soong and Nakano communications systems is based on one of the assigned band-edge channels from the frequency bands.

Claim Objections

2. Claims 16-17 and 20-21 are objected to because of the following informalities:

In line 2 of both claims 16 and 17, “maximum transmission” should be “maximum system transmission”.

In claim 20, line 4, “to assigning a first” should be “to assign a” since no other channel is recited in claims 20 and 21; lines 7-8, “the second device via the first” should be “the second communication device via the”.

In lines 1 and 4 of claim 21, “communications” should be “communication”.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States

only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-17 and 20-21 are rejected under 35 U.S.C. 102(e) as being anticipated by Soong et al..

Soong et al. (U.S. Patent No. 6,687,238) discloses a CDMA base station for descressing DCMA signal peaks, shaping the in-band frequency spectrum of CDMA signal, generating a ratio of in-band to out-of-band signal strength, and controlling transmit power based on quadrature calculations.

With respect to claims 1-17 and 20-21, Figures 6-9 show the communication between a base station and a mobile station, wherein each of the base station and the mobile station comprises a transmitter and a receiver, the transmitter of the base station transmits a first signal assigning a first band-edge channel of a guard band to the receiver of the mobile station at a reduced power lever of a maximum system transmission power level of the base station while the transmitter of the mobile station transmits a second signal assigning the first band-edge channel and/or a second band-edge channel of a guard band to the receiver of the base station at the same or a reduced power level of the maximum system transmission power level of the base station or a maximum system transmission power level of the mobile station. See the detailed discussion of Figures 6-9 from column 6, line 13 to column 8, line 49.

5. Claims 1-17 and 20-21 are rejected under 35 U.S.C. 102(e) as being anticipated by Nakano et al..

Nakano et al. (U.S. Patent No. 6,687,238) discloses a base station 422 of a second system performs communications using frequency adjacent to a frequency

employed by communication between a base station 412 and a mobile station 414 of a first system to avoid the interference between the first system and the second system.

With respect to claims 1-17 and 20-21, Figures 4-11 show the embodiments for communication between one of the base stations 412 and 422 and the mobile station 414, wherein each of the base station and the mobile station comprises a transmitter 630 or 730 and a receiver 640 or 740, the transmitter 630 of the base station transmits a first signal assigning a first band-edge channel of a guard band to the receiver 740 of the mobile station at a reduced power lever of a maximum system transmission power level of the base station while the transmitter 730 of the mobile station transmits a second signal assigning the first band-edge channel and/or a second band-edge channel of a guard band to the receiver 640 of the base station at the same or a reduced power level of the maximum system transmission power level of the base station or a maximum system transmission power level of the mobile station. See column 4, lines 41-55, and column 6, line 11 to column 7, line 28.

Conclusion

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the

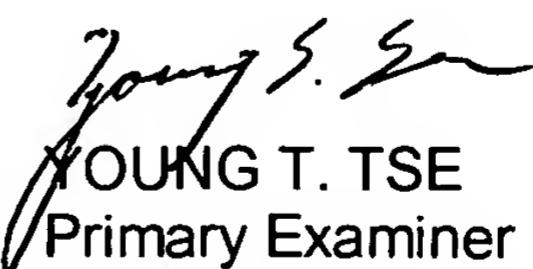
Art Unit: 2637

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to YOUNG T. TSE whose telephone number is (571) 272-30513051. The examiner can normally be reached on Monday-Thursday and alternative Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jay Patel can be reached on (571) 272-2988. The Central FAX Number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


YOUNG T. TSE
Primary Examiner
Art Unit 2637